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Intergovernmental Group on the
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Geneva, 26 March 1990

SECOND UNITED NATIONS CONFERENCE ON THE LEAST DEVELOPED COUNTRIES

Preparatory process for the Conference

SCIENCE AND TECHNOLOGY IN THE DEVELOPMENT OF LEAST DEVELOPED COUNTRIES

Contribution by the United Nations Centre for Science and Technology */

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OF THE LEAST DEVELOPED COUNTRIES

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INTRODUCTION

The adoption of the Vienna Programme of Action[1/] (VPA) by the United Nations Conference on Science and Technology for Development in 1979 symbolized the recognition by the international community of the need to assist developing countries in building their creative and innovative capacities, to enable them to participate equitably in a process of accelerated transformation of the world economy based on advances in science and technology - including the applied social sciences. As regards special categories of developing countries, the VPA already highlights the requirement for specific action to meet the urgent and specific problems of the least developed, land locked, island and most seriously affected developing countries.

Two years later, the first United Nations Conference on the Least Developed Countries adopted the Substantial New Programme of Action for the 1980s for the Least Developed Countries[2/] (SNPA), in response to the challenge represented by over 40 countries facing the most acute structural handicaps in their efforts to achieve even minimal development standards for all their populations. In dealing with the issue of science and technology, the SNPA coincided with the principles of the Vienna Programme of Action and called on the international community to make every effort to accelerate the technological transformation of the least developed countries (LDCs), including the provision of assistance to establish and strengthen their institutional infrastructures in this area.

In recognizing the validity of the principles of the Vienna Programme and the SNPA and after a ten-year review of the implementation of the VPA in 1989, the Intergovernmental Committee on Science and Technology for Development mandated the Centre for Science and Technology for Development (CSTD) to enhance its efforts to promote international co-operation in building the scientific and technological capacities of the LDCs

and to make a substantive contribution to the preparation of Second Conference on the Least Developed Countries.[3/]

In pursuance of this mandate, the Centre participated in the work of the Preparatory Committee leading to the formulation of the draft text of the Programme of Action for the Least Developed Countries for the 1990s. The draft proposes measures for the strengthening of the scientific and technological base of the LDCs and reiterates the appeal to the international community to assist them in acquiring an adequate infrastructure in the field of science and technology.[4/]

Finally the General Assembly, at its eighteenth special session in May 1990, adopted the Declaration on International Economic Co-operation, in particular the Revitalization of Economic Growth and Development of the Developing Countries.[5/] This Declaration contains, inter alia, the following references to the issues discussed in this paper.

(a) Substantial concessional resources will be called for to enable developing countries, especially the least deveoped ones, to cope with the challenges of the 1990s ... Developed countries should enhance the quantity and quality of their aid. Appropriate additional resources for the least developed countries should be considered at the Second United Nations Conference on the Least Developed Countries. The special development problems and needs of the island and land-locked developing countries should also be addressed.

(b) Scientific and technological capability is increasingly important in the development of developing countries. Developed countries and international organizations should support the efforts of developing countries to create and develop endogenous capacities in this area."

c) The economic growth and development of developing countries are essential in order to address problems of the degradation and protection of the environment. New and additional financial resources will have to be channelled to developing countries. Effective modalities for favourable access to, and transfer of, environmentally sound technologies, in particular to

developing countries, including on concessional and preferential terms, should be examined.

In presenting the information that follows to te Second United Nations Conference on the Least Developed Countries, the Centre for Science and Technology for Development hopes that it may be useful to the Conference in considering science and technology capacity as a factor which pervades inseparably all aspects of the development of the LDCs.

SCIENCE AND TECHNOLOGY PERFORMANCE IN THE LEAST DEVELOPED COUNTRIES IN THE 1980S

Analyses from all sources have concluded that the economic situation of the LDCs taken as a whole became considerably worse during the 1980s. The productive base of these countries continued to be weak and their economies extremely vulnerable to changes in the international environment. As regards their performance agricultural output, chronically affected by natural disasters and lack of adequate technology among other factors, grew only at about half of the target rate of 4 per cent proposed in the SNPA. Manufacturing output increased at less than one-quarter of the SNPA target of 9 per cent, which represents only half of the level of the previous decade, with the industrial sector often suffering from a deteriorating infrastructure and inappropriate technology. More generally, for all the developing countries the objectives of the Vienna Programme of Action in terms of more equitable participation by them in global scientific and technological progress through increased international aid remained largely unfulfilled by the end of the 1980s.

However, against this disappointing backgound, some signs must be observed that in the 1980s the least developed countries may have started a longer-term process of cumulative building of their scientific and technological base for future development. In the

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first place, for the LDCs performance should be assessed differently in so far as those countries are building their science and technology systems practically from scratch and in addition many are very small both in population size and economic scale. Thus, science and technology capacities have to be viewed in relation to such essential factors as building a minimum stock of specialized personnel (including the use of training abroad) and acquisition of at least better information and understanding of external technological developments. Under these conditions very modest improvements, particularly through foreign aid, could have considerable consequences.

In terms of commitment, it can be said that from the start the process of international co-operation to deal with science and technology issues has benefited from a high degree of political will on the part of LDCs. This might be reflected in the fact that of the 30 United Nations member states identified as least developed in 1979, 27 were represented, in many cases at the ministerial level, at the 1979 United Nations Conference on Science and Technology for Development, in whose preparation and outcome they played an important role. Moreover of the 39 LDCs which are current members of the United Nations[6/], 38 have designated national focal points for co-operation with the Organization on matters of science and technology. Further evidencing the countries' commitment to science and technology development, most of these focal points are institutions dealing with science and technology policy issues at the national level, some of which are headed by Government ministers.[7/] Throughout the 1980s, the LDCs also participated actively in the work of the Intergovernmental Committee on Science and Technology for Development and nationals of LDCs in their personal capacity made a distinguished contribution to the work of its subsidiary organ, the 28-member Advisory Committee on Science and Technology for Development.

In relation to LDCs' capacity-building performance in science and technology it should be observed that nine of these countries with current populations of 15 million or more[4/] which represent a total of 330 million (three-quarters of the overall LDCs' population) managed even under the adverse conditions of the 1980s to maintain or increase their stock of scientists, engineers and technicians, as well as their level of expenditure in science and technology infrastructure. As a whole, LDCs increased their estimated adult literacy rate from 26 per cent in 1980 to 40 per cent in 1990 and in the same years their secondary and tertiary level enrolments, while remaining low, made significant gains.

An overview of science and technology performance features in these nine LDCs is given in Annex I.

CONTRIBUTION OF THE UNITED NATIONS SYSTEM TO SCIENCE AND TECHNOLOGY CAPACITY BUILDING IN THE LEAST DEVELOPED COUNTRIES

As reflected in the review papers before the Second Conference, during the 1980s the organs, organizations and bodies of the United Nations system made substantial contributions to the implementation of the SNPA in their fields of competence. In its co-operation activities in LDCs the system gave priority to the strengthening of national capacities and to the development of human resources.

In this context, agriculture continued to be the most important sector of the economies of the LDCs and consequently manpower development, technological innovation and research in agriculture were at the center of science and technology capacity building efforts by the LDCs.

In addition the development of the industrial sector of LDCs, including agro-industries and small-scale industries, also required

the building of a human resource and technology base, including policy-making staff. Similaly, during the past decade health, education and training in the LDCs demanded growing financial as well as scientific and technological resources whose optimum use was often hampered by the lack of a comprehensive approach to science and technology capacity by the Governments concerned.

In keeping with the above trends, technical co-operation country projects executed in LDCs by United Nations system agencies under the financing of UNDP emphasized the areas of agriculture, forestry and fisheries (by FAO); education (by UNESCO); industry (by UNIDO and sometimes the World Bank); and health (by WHO). Projects classified under the area of science and technology involved a variety of executing agencies notably UNESCO, WMO and UNIDO. While classification areas often overlap, all UNDP projects have the purpose of building national capacity to undertake development activities, and thus generally involve identifiable science and technology components.

By the very nature of its mandate CSTD, under the guidance of the Director-General for Development and International Economic Co-operation, is called upon to play a pivotal role in the co-ordination of system-wide activities in the field of science and technology. In this connection, the Centre provides the secretariat for the Inter-agency Task Force on Science and Technology for Development of the Administrative Committee on Co-ordination (ACC) and assists the secretariat of the ACC in its work relating to science and technology.

Within the framework of this co-ordination process, the ACC at its first regular session of 1989, adopted a statement on science and technology for development[9/] which highlighted three areas for future activity, as follows.

First, promotion of endogenous capacity-building through the involvement of all segments of society concerned with the development process to help identify prioritized activities in science and technology.

Secondly, assistance in the development of technology assessment capacities in order to enable countries to deal with the transfer of technology and with new and emerging areas of science and technology for development.

And thirdly, enhancement of the collective contribution of the United Nations system to endogenous capacity building of developing countries through technical co-operation activities, including joint inter-agency missions.

Thus CSTD, in co-operation with the United Nations system, has initiated a series of pilot projects of inter-agency scope aimed at identifying future capacity-building needs and priorities in a number of developing countries, including in particular five of the LDCs: Cape Verde, Nepal, Tanzania, Togo and Uganda. The results of these projects and others to come should provide a realistic basis for the implementation of science and technology objectives of the Programme of Action for the 1990s in the countries concerned.

The guideline for these pilot projects is given in Annex II.

POLICY ISSUES IN THE BUILDING OF ENDOGENOUS SCIENCE AND TECHNOLOGY CAPACITIES IN THE LDCs DURING THE 1990s

The 1979 Vienna Programme of Action, whose validity was reaffirmed by the General Assembly at its forty-fourth session[19/] in 1989, contains a comprehensive identification of the substantive issues which the international community will continue to face in

the field of scientific and technological development. The paramount goal of the Vienna Programme was the strengthening of the developing countries own endogenous scientific and technological capacities. In 1989 the Advisory Committee on Science and Technology for Development suggested a definition of endogenous capacity in the following terms.

> An "endogenous capacity" may be defined as the extent of local capability to exercise independent, informed judgement and actions regarding the generation, acquisition, and deployment of technologies for economic and social development, including the fulfilment of basic human needs, within a society. Ideally, such capacity will have the ability to self-regenerate, while maintaining good linkages around the world as one way of constantly tapping global activities in science and technology.[11/]

The basic objective of building the endogenous science and technology capacity of the LDCs will require primarily the efforts of LDCs--in partnership with the United Nations system and the members of the international development co-operation community. Investments in science and technology, which are an essential precondition for sustained development, have economic returns mostly in the long-term, thus imposing paradoxical choices on the LDCs which are overwhelmed with critical short-term needs. The conditions of the 1990s may offer an unequaled opportunity for donors to build on the scarce but significant basis slowly developed in past decades (universities, policy-making basis, research leadership) by making decisive efforts now in favour of the LDCs.

The following policy issues should be highlighted in relation to national and international action in the 1990s.

AT THE NATIONAL LEVEL

In their development policies and plans the LDCs should give adequate consideration to:

1. Intensifying their efforts of previous decades to build their own endogenous science and technology capacities and further co-operating with other developing countries in initiatives taken at the bilateral, sub-regional, regional and inter-regional level, particularly in activities of education, training and research.
2. Building a capacity for the management of technology at the national, sectoral and the enterprise levels, including the complementary capabilities to monitor, forecast, assess, select, acquire, generate, deploy and update the technologies needed for development, particularly in agriculture, industry, health and education.
3. Capabilities to deal with environment issues. In the 1990s, the LDCs are likely to be faced with technology choices in which environmental considerations, ranging from the local to the global level, will play an increasingly important role and that will accentuate the urgency of acquiring capabilities for technology assessment, notably through regional co-operation. In particular, international pressure for the deployment of environmentally sound technologies will create new demands for specialized scientific knowledge and international negotiating skills on the part of LDCs.
4. The cost-effective development of manpower trained in the field of science and technology, including scientists, engineers, technicians and specialized labour of both sexes and the implementation, in co-operation with their development partners, of measures to provide for the rehabilitation of the infrastructures of education and training institutions, particularly research laboratories in universities and institutes of technology.

5. The development of agricultural research including biotechnologies and the adaptation and generation of new agro-industrial technologies with a view to enhancing their competitiveness in international markets.
6. Participation in the activities of new scientific international non-governmental organizations oriented towards the needs of the South, such as the Third World Academy of Sciences in Trieste, Italy (effectively established in 1985) and its Third World Network of Scientific Organizations[12/] which was created in 1988. Moreover, at the regional level, the African Academy of Sciences (founded in 1985); the Pan-African Union of Science and Technology (established in 1987) and the Federation of Asian Scientific Academies and Societies (founded in 1984). In connection with item 1 above, LDCs should stimulate the grouping of their technology assessment specialists in national associations and their participation in the activities of international non-governmental organizations in the field of technology management, assessment and forecasting.

AT THE INTERNATIONAL LEVEL

In addressing the special needs and priorities of LDCs in the field of science and technology capacity-building, the international development community should consider the following:

7. The proposals regarding the strengthening of the scientific and technological base contained in the draft Programme of Action for the Least Developed Countries for the 1990s as the reflection of an international consensus in this area.
8. The views expressed by the Advisory Committee for Science and Technology for Development in its contribution to the preparation of the International Development Strategy for the 1990s, particularly that:

(a) There is a need for a broad new strategy to ensure increasingly widely distributed access to modern scientific and technological knowledge essential to alleviating poverty, reducing population pressures, achieving minimum standards of health and nutrition, improving educational opportunies, ensuring environmental sustainability and promoting economic growth;

(b) There is urgency to increase the flow of international funds to support the build-up of scientific and technological capabilities in the developing countries to complement national resources and involve multilateral, regional, bilateral and private channels. In addition, that in this connection a new role is likely to be found for South/South co-operation between developing countries to share views, approaches and solutions to similar problems; and

(c) A special effort should be made to ensure that the smaller developing countries, which cannot afford an extensive and broad science and technology infrastructure, will have access to the scientific and technological knowledge that could contribute to their development efforts.

NOTES

1/ A/CONF.81/16.

2/ A/CONF.104/22/Rev.1.

3/ A/44/37, Supplement No. 37, para. 3, resolution 2(X), item 8.

4/ A/CONF.147/PC/Misc.5, paras. 80-85.

5/ General Assembly resolution S-18/3, paras. 27-29.

6/ Taking into account that on 22 May 1990 Yemen and Democratic Yemen merged into a single state called the Republic of Yemen and that Kiribati and Tuvalu are not members of the Organization.

7/ A registry of national focal points for science and technology for development is contained in document A/CN.11/INF/10 of 13 May 1987.

8/ Afghanistan, Bangladesh, Ethiopia, Mozambique, Myanmar, Nepal, Sudan, Tanzania, and Uganda.

9/ ACC/1989/DEC/1-20: ACC decision 1989/7.

10/ General Assembly resolution 44/14.

11/ A/CN.11/91 of 23 May 1989, para. 13.

12/ Institutions in Bangladesh, Ethiopia, Guinea Bissau, Nepal, Tanzania and Uganda already participate.

ANNEX I

FEATURES OF SCIENCE AND TECHNOLOGY PERFORMANCE OF NINE LDCs IN THE 1980s

Afghanistan

In the 1980s the country's economy, especially agriculture, was seriously damaged by war and incipient science and technology capabilities developed previously have not been strengthened. Manufacturing output growth slowed down and food production and distribution suffered major disruption. The three leading exports in the 1980s were natural gas, raisins and carpets. The Academy of Sciences (f.1979) had a Science Research Centre in Kabul with about 40 researchers working in botany, zoology, geology, chemistry, seismology and computer science. Older educational institutions such as the University of Kabul, the Kabul Polytechnic and the Institute of Agriculture have continued to provide science and technology graduates. The University receives considerable assistance from UNDP and FAO in the fields of forestry and veterinary medicine. The Planning Department, Ministry of Industry and Mines plays a co-ordinating role in matters of science and technology development.

Bangladesh

In 1979 the country reported to the Vienna Conference a stock of 30,000 post-graduate level scientists and engineers and 100,000 technicians. Also, over 50 active research and development institutions, 300 higher education institutions and over 8,000 middle-level training centres. Bangladesh is still recovering from the effects of catastrophic floods in 1987 and 1988 which crippled its productive base. It has the largest manufacturing sector as well as the largest and most developed science and technology system of all LDCs. The public sector plays the dominant role in technology assessment and decision-making, but technology imports do not take place under an overall policy framework. The Council of Scientific and Industrial Research under the Ministry of Scientific and Technical Research promotes and guides research on problems of new industries, provides patents and facilitates the utilization of technology developed in its institutes and laboratories. Institutional restructuring aimed at accelerating the flow of foreign investment has begun. The three leading exports in 1980 were weaves of jute; bags of jute and raw jute. By 1987, men's shirts had become the leading export, followed by weaves of jute and bags of jute. In addition to garments, Bangladesh hopes to attract export-oriented investments in toys, leather and consumer electronics industries. With a record grain harvest in 1990, the country may be close to achieving the target of food self-sufficiency by 1992.

Ethiopia

The manufacturing sector grew at about 4 per cent annually from 1980 to 1987 and agricultural production stagnated. The three leading exports remained coffee, fuel oil and sheep skins. In 1979, the country reported to the Vienna Conference a stock of 500 scientific workers in 35 institutions and a total science and technology trained manpower of 5,000. The Ethiopian Science and Technology Commission continued as the central co-ordination body in this field. In 1986, the Alemaya University of Agriculture was granted university status. The older Addis Ababa and Asmaya universities received UNDP assistance for the strengthening of their faculties of science and technology. The Ethiopian Centre for Technology entered into a second phase of UNDP assistance in 1985.

Mozambique

In the 1980s, manufacturing output fell by over 10 per cent annually and agricultural production by about one per cent. The three leading exports in 1980 were cashew nuts, shell fish and tea. In 1987, the order was shell fish, cashew nuts and sugar. Important UNDP and FAO assistance was started in 1983 to support the development of agricultural research in the country. The Eduardo Mondlane University (f.1962) which includes faculties of science, engineering, agronomy and forestry, economics and veterinary medicine, plays a co-ordinating role in the area of science and technology. The institution received considerable UNDP, FAO and UN assistance.

Myanmar

Manufacturing grew at 2.6 per cent annually and agriculture at about 2 per cent. The three leading exports in 1980 were rice; sawlogs and veneerlogs (non coniferous) and pulses. By 1987 rice had dropped to a second place with logs as the lead export. UNDP and FAO assisted in a pilot plant for composite plywood from 1982 to 1989. The Central Research Organization (CRO) is the only established research institution for the industrial sector besides the universities. UNDP and UNIDO assisted CRO in the areas of pulp and paper polymers and pesticides. In 1986-1987, a new curriculum was introduced at the basic education level and the country is improving the overall education system including technical, agricultural, vocational and higher education. During the decade, a rice-paddy intensification programme boosted paddy production through high yielding seed varieties, fertilizers, plant protection chemicals, agricultural extension services and credits.

Nepal

During the decade per capita agricultural output stagnated while the manufacturing sector grew at a real average rate of 10 per cent. Manufacturing share in GDP remained stable at about 4 per cent. The

three leading exports in 1980 were goat and kid skins; sawlogs and veneerlogs (non-coniferous) and raw jute. By 1987, these had changed to wool carpets, dresses and jute goods. The Nepal Academy of Science and Technology was established in 1982 having the Prime Minister as its Vice-Chancellor, and has become the country's main policy organ. During the 1980s, the output of university graduates in science and technology areas grew steadily. The National Council for Science and Technology (f. 1976) continued to administer financial grants for research, publications and scientific events. In 1981, the International Centre for Integrated Mountain Development was established in Kathmandu, under the auspices of UNESCO, with the participation of Afghanistan, Bangladesh, Bhutan, China, India, Myanmar, Nepal and Pakistan. The Centre explores the current state of knowledge notably on rural planning, engineering and appropriate technology. In 1988, UNCSTD began a pilot project in Nepal aimed at identifying national priorities and activities for science and technology development, as a basis for co-operation with external donors in the 1990s (see Annex II).

Sudan

The manufacturing sector lost ground on a per capita basis during the 1980s while slightly increasing its share of GDP. Crops were gravely damaged by the combined effects of floods, locust infestations and armed conflict. Food shortages were chronic during the decade. The three leading exports remained raw cotton, sorghum and oilseeds. The National Council for Research (f.1970) co-ordinates overall research efforts in the country (Agricultural Research Corporation, Industrial Research and Consultancy Centre, universities). It includes a unit to survey the science and technology potential, which seeks to provide a statistical basis for capacity-building policy. The Council publishes since 1984 the National Register of Current Research, which contains information on research projects, surveys and doctoral dissertations being carried out in Sudan, about the country and by Sudanese abroad. The Omdurman Ahlia University was established in 1986, offering degrees in management. Some emigrated professionals have begun to return.

Tanzania

Agricultural production per capita fell by an average of 2.3 per cent annually from 1980 to 1988 and manufacturing output decreased at a rate of 3.5 per cent between 1980 and 1987. The three leading exports in 1980 were coffee, spices and raw cotton. By 1987, the order was coffee, raw cotton and cashew nuts. In spite of the unfavourable economic evolution, the country was able to make progress in building its self-reliant scientific and technological capacity. National expenditure in research and development grew from an estimated 0.5 to over 1 per cent of the GNP during 1980-1989 and the Tanzania Commission for Science and Technology was strengthened. The University of Daar es Salam considerably increased the number of its teachers holding M.S. and Ph.D. degrees through its own post-graduate education programmes. In 1984, Sokoine University of Agriculture was established in Chuo Kikuu, Morogoro (students number 600 at present). In 1989, CSTD initiated a pilot project aimed at identifying national priorities and activities for science and technology development as a basis for future co-operation with external donors (see Annex II).

Uganda

During the last decade, civil armed conflict had devastating effects. Manufacturing output declined in per-capita terms and slightly diminished its share in GDP. Per capita agricultural production recovered only in 1987 and 1988. The three leading exports remained coffee, raw cotton and tea. Despite disruption, the education system continued to turn out high quality graduates and kept its standards. Makerere University (which acquired the university in 1970) is a centre of excellence in the region. It currently has 7,000 students in different areas including science, technology, agriculture, commerce and social sciences, a 400,000 volume main library and the Makerere Institute for Social Research with six resident fellows. The Inter-University Council for East Africa (f.1980) in Kampala co-ordinates policies between Kenya, Tanzania and Uganda. The Uganda National Council for Science and Technology for Development (f.1988) is under the Ministry of Industry and Technology (MITEC) and the Ministry of Planning and Economic Development. Research is carried out in seven small units in the fields of agriculture, animal husbandry and coffee. MITEC (which includes the office of Commissioner of Technology) is presently undertaking a national survey of technical manpower, but technological policy is incipient. In 1990 UNCSTD began the implementation of a pilot project aimed at identifying national priorities and activities in science and technology development as a basis for future co-operation with external donors (see Annex II). The establishment of a national university of science and technology is being contemplated.

Notes

The letter "f" means "founded in" (year).

The three leading exports are listed in descending order of their share in total exports.

ANNEX II

PROJECT GUIDELINE FOR

BUILDING ENDOGENOUS CAPAICTY THROUGH NATIONAL POLICY DIALOGUES

- Concept, Objectives, Approaches and Output

1. Concept

The ability of a country to use science and technology for social and economic development is to a large extent determined and measured by its endogenous capacity in science and technology. Endogenous capacity is the capacity to make reasonable and independent decisions regarding one's needs, priorities and approaches to obtain one's goals. Specifically, it is the human and institutional capabilities necessary to answere a fundamental question: how and where should technology, indigenous or imported, be targetted so as to make a most direct, maximum impact on solving development problems.

Building endogenous capacity is a difficult, yet essential route to development. While every country has some indigenous capability in science and technology, such as an infrastructure, scientists and technicians, R&D institutions and so on, it provide only a necessary condition. Endogenous capacity goes beyond indigenous capability to incorporate the ability to exercise independent, informed judgment on actions regarding the generation, acquisition, and deployment of technologies for economic and social development. It is the ability to understand and manage the technological linkages to the educational system, the productive sector, the social structure, and the processes of governance and decision-making for national development.

Endogenous capacity is also a time related concept in that it is developed and maintained only in the dynamic process technology assessment and decision making. Countries can lose as well as develop such capacity over time. No amount of institutionalization can guarantee such capacity.

An important element in national endogenous capacity building is a continuous "self-enlightment" policy process whereby stakeholders - Government authorities, productive sectors, R&D communities, entrepreneurs, individuals, etc. - come to discuss and build a consensus on the needs and priorities for science and technology in development and allocate corresponding resources for its implementation.

While this is an on-going process in varying degrees in all countries, the past failure of many countries in using S&T policy and planning apparatus to generate the desired output points to the fact that certain necessary linkages are missing between national S&T endeavours and the mainstream of a country's social/economic activities, and that necessary consensus among stakeholders is absent. This is further compounded by the adverse international economic/technical environment and the inability of most developing countries to access technologies developed in the industrialized society.

Constructive policy dialogues among the stakeholders, supported by solid in-depth studies can facilitate a better understanding of the needs, capabilities and priorities of different sectors of a country and bring into focus national resources and international assistance on the most critical areas.

2. Objectives

The immediate objectives of the project are to

(1) induce policy adjustments necessary to create a milieu conducive to bring science and technology to the service of national social/economic objectives;

(2) identify overlapping interests in science and technology among stakeholders;

(3) facilitate a consensus on areas of priority actions among all constituents;

(4) establish an organic mechanism for interaction among stakeholders and make the best use of available local scientific/technological expertise and existing S&T infrastructure;

(5) analyze the pattern and effectiveness of resource flows into science and technology from national and external sources in terms of their adequacy towards endogenous capacity building.

(6) develop a portfolio of prioritized initiatives for national support and international assistance;

3. Approach

The project will undertake a series policy dialogues among stakeholders in science and technology which is essentially a process of participatory decision making. The stakeholders include Government policy-makers, entrepreneurs, educators, scientists and representatives of organized public groups, each of which represents a particular vested interest as well as sharing a common stake in the development process.

Substantial in-depth studies of the problems and potentials are needed. Local and international consultants will be mobilized to provide necessary data and identify issues. A set of common areas are: 1) S&T system - policies, R&D institutions, education, training services etc,; 2) macro-economic policies - fiscal, budgetary, trade, industrial, investment; 3) human and natural resources availability, including organizational ability; and 4) structure of demand and supply for science and technology.

The United Nations as a neutral institution, can facilitate frank exchanges of views and help identify common areas of priorities agreeable to all.

Priority will be given to the inter-sectoral dimensions of development with emphasis on a few science and technology related sectors which are critical to the social/economic objectives of the country.

The project is envisaged in eight steps:

(1) CSTD/FSTD joint exploratory field mission to define a terms of reference for each participating country;

(2) recruitment of national and international consultants to undertake substantive studies;

(3) preparation of background documentation for national policy dialogues;

(4) national policy dialogues to idenfity the role of S&T in meeting priority development needs of the country concerned, including the role of local S&T personnel and structure;

(5) preparation of an impact evaluation on the experiences of externally funded S&T activities related to endogenous capacity building, with particular reference to the role of the UN ssytem;

(6) inter-agency missions based on the impact studies;

(7) preparation of a portfolio of prioritized initiatives;

(8) soliciting resources for the above projects.

4. Output

The expected output of this exercise will be the following:

(1) concepts and strategies to develop a science and technology structure specific to each country's needs and priorities;

(2) a portfolio of prioritized initiatives in science and technology for development;

(3) a set of modalities for strengthening endogenous science and technology capacities for other developing countries.

(4) an impact evaluation of the effectiveness of externally funded S&T activities related to the enhancement of endogenous capacity building, with particular emphasis on the role of the UN system; and,

(5) coalition of resources, from both national and international sources, to implement the above projects.

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SECOND UNITED NATIONS CONFERENCE ON THE LEAST DEVELOPED COUNTRIES:

Preparatory process for the Conference

Population in the Least Developed Countries Progress in the 1980s - Challenges for the 1990s*/

Contribution by the United Nations Population Fund (UNFPA)

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POPULATION IN THE LEAST DEVELOPED COUNTRIES

PROGRESS IN THE 1980s - CHALLENGES FOR THE 1990s

Contribution by the United Nations Population Fund (UNFPA)

July 1990

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I. INTRODUCTION

1. This paper examines demographic trends as well as Governments' perceptions and policies since 1981, when the United Nations Conference on the Least Developed Countries (Paris) adopted the Substantial New Programme of Action for the 1980s for the Least Developed Countries (SNPA for the LDCs). It also examines the role of assistance from the United Nations Population Fund (UNFPA) for population programmes in the countries classified as LDCs, and it concludes with an outline of areas for further action. 1/

2. The SNPA gives considerable attention to the topic of population and its role in development. Noting that the rapid rate of population growth in a number of the LDCs had impeded their Governments' efforts to reach development goals, the SNPA emphasizes the significance of population growth, particularly its interrelationship with rural development and food production. It also examines the need to reduce infant mortality and the significance of internal and international migration. The SNPA recommends that population policies should be treated as an integral part of development policies, observing that action to address the problem of population growth, if carried out within the framework of concerted development efforts, can help countries attain their development goals. The SNPA envisages the provision of voluntary family planning measures within the framework of national demographic policies, with emphasis on research into safe, more efficient and acceptable family planning techniques. It notes the importance of motivational activities, population education, information and efficient delivery services. It also proposes that the full participation of men and women in population programmes should be encouraged. 2/

3. Section II, below, discusses the demographic and socio-economic situation of the LDCs; section III deals with the responses to demographic conditions and UNFPA assistance; and section IV outlines actions that would help Governments address the problems.

1/ In 1982, 36 countries were classified as LDCs. By 1988, 42 countries were classified as LDCs: Afghanistan, Bangladesh, Benin, Bhutan, Botswana, Burkina Faso, Burundi, Cape Verde, the Central African Republic, Chad, Comoros, Democratic Yemen, Djibouti, Equatorial Guinea, Ethiopia, the Gambia, Guinea, Guinea-Bissau, Haiti, Kiribati, Lao People's Democratic Republic, Lesotho, Malawi, Maldives, Mali, Mauritania, Mozambique, Myanmar, Nepal, the Niger, Rwanda, Samoa, Sao Tome and Principe, Sierra Leone, Somalia, the Sudan, Togo, Tuvalu, Uganda, the United Republic of Tanzania, Vanuatu and Yemen.

2/ Substantial New Programme of Action for the Least Developed Countries (SNPA).

II. DEMOGRAPHIC AND SOCIO-ECONOMIC SITUATION IN THE LEAST DEVELOPED COUNTRIES

A. Demographic situation

4. The 1988 population of the LDCs totalled more than 400 million, or 8 per cent of the world's total population. 3/ Between 1980 and 1985, the population of the LDCs increased by 44 million, and from 1985 to 1990 it was projected to grow by an additional 55 million. (See tables 1 and 2 for selected demographic indicators for individual countries.)

5. Over the past decade, the crude birth rate (CBR) of the LDCs declined slightly, from 45.0 to 43.7 (from 1980-1985 to 1985-1990). The average life expectancy at birth during the 1980s increased by only 2 years, to 49 years--still less than the minimum target of 62 years in 1985 set by the World Population Plan of Action in 1974. 4/ Infant mortality, estimated at 133 per 1,000 live births in 1980-1985, declined by 8 per cent, to 123 per 1,000 in 1985-1990.

6. The population of the LDCs grew at an increasing average annual rate of 2.4 per cent in 1980-1985, and 2.7 per cent annually in 1985-1990. Urban population, which constituted 17 per cent of the total population in 1989, grew at 5 per cent annually in the period 1980-1990--about twice the rate of the total population.

7. According to United Nations projections, population growth in the LDCs will continue to accelerate to 2.9 per cent per annum in the 1990s before slowing down gradually in the next century to 2.4 per cent per annum (2005-2010) and 1.7 per cent per annum by 2025. As a result of moderate progress in socio-economic development and increased availability and use of contraceptive methods, the total fertility rate (TFR) of 5.97 per fertile woman, estimated for 1988, is expected to decline to 5.47 by the end of the century and to 2.96 by 2025. Life expectancy is projected to increase to 53 years by the year 2000 and to 63 years by 2025.

3/ Unless otherwise indicated, the demographic estimates and projections (medium variant) shown in this report are from the United Nations Population Division, Department of International Economic and Social Affairs, World Population Prospects: 1988 (United Nations publication, Sales No. E.88.XIII.7), particularly pp. 258-259 and 468-469.

4/ See Report of the International Conference on Population, 1984, Mexico City, 6-14 August 1984 (New York, United Nations, 1984), p. 19, para. 21, which notes the targets set in the World Population Plan of Action for 1985 and the year 2000 (74 years). Recommendation 14 of the International Conference on Population sets a new target of 60 years by the year 2000 for countries with higher mortality levels.

8. As a result of these demographic trends, the population of the LDCs will total more than half a billion (585 million) in the year 2000 and more than one billion (1,010 million) by the year 2025. Thus, during the next 35 years, the population of the LDCs is expected to increase by more than 100 per cent, whereas that of other developing countries will increase by about 65 per cent. Despite the deceleration of the population growth rate in the next century, the population size will expand faster in 2025 than now, with 16.5 million added each year, as compared with 8.8 million in 1980-1985 and 11.1 million in 1985-1990.

9. Moreover, because of migration, the population living in urban centres will expand by about 357 million--from 84 million in 1990 to 441 million in the year 2025, when the urban population will constitute 44 per cent of the total LDC population. Many cities in the LDCs--for example, Dhaka in Bangladesh and Yangon in Myanmar--may become unmanageably crowded if present trends continue.

10. In sum, nearly 10 years after the adoption of the SNPA, the LDCs were still confronting many of the problems they had been dealing with a decade ago. The aggregate levels of fertility, mortality and rates of natural increase were still higher in the LDCs than they were in other developing countries. In the LDCs, infant mortality rates were 49 per cent higher than they were in other developing countries. The expectation of life at birth was nearly 11 years less than it was in other developing countries. Moreover, it was about the same level as life expectancy in all developing countries in the 1960s. Total fertility in the LDCs was higher during 1980-1985 than it had ever been for all developing countries. The proportion of juvenile populations was also much higher than in other developing countries.

B. Socio-economic situation

11. Along with the pressing demographic issues mentioned above, the LDCs experienced profound economic upheavals during the 1980s. Almost all the LDCs saw their situation worsen in all respects. Because of the 1980-1983 recession, the developed countries cut back demand, hurting most of the LDCs that exported traditional commodities. Moreover, developed countries seemed to be depending less and less on imports of raw materials for their new development processes, based on technological innovations. As a result of weak demand, terms of trade deteriorated for the LDCs. Over the same period, the growth of foreign debt almost doubled, with most of the LDCs borrowing to cover increases in oil prices. The resource needs of the LDCs grew substantially as their export earnings and purchasing power fell, while debt service obligations increased--from $2 billion in 1982 to $3.5 billion in 1988, and additional financial requirements to support rehabilitation and adjustment programmes arose. In some cases, climatic conditions worsened the unfavourable international environment. For example, most of the LDCs in Africa underwent periods of drought.

12. Consequently, the growth rate of the gross domestic product (GDP) of the LDCs as a group increased on average by only 2.2 per cent in the 1980s, against an annual population growth rate of 2.5 per cent. The SNPA target for annual growth in GDP was 7.2 per cent.

Some of the LDCs even had negative average growth rates in GDP. Only five countries--Bhutan, Botswana, Cape Verde, Maldives and Yemen, 5/ which had the capacity to generate foreign exchange through items other than traditional commodities--were able to maintain a relatively satisfactory growth rate, at least one that was higher than the population growth rate.

13. Agriculture, a vital and principal sector of economic activity in the LDCs, also experienced low growth. In other developing countries, advances in food production during the 1980s, particularly as a result of the Green Revolution and reduction of the population growth rate, boosted production substantially--to equal or exceed population growth rates. In most of the LDCs, however, the opposite occurred. According to the United Nations Conference on Trade and Development (UNCTAD), the annual growth of agricultural production in the LDCs was 1.6 per cent, against the target of 4 per cent set in the SNPA. Average annual growth of agricultural production exceeded 4 per cent in only six LDCs--Benin, Bhutan, Burkina Faso, Cape Verde, Guinea-Bissau and Yemen. Most of the LDCs became increasingly dependent on food imports during the 1980s.

14. The deteriorating economic situation, coupled with rapid population growth, has worsened the human condition and the quality of life in the LDCs over the decade. A staggering number of people are living in absolute poverty. Unemployment has worsened. Malnutrition, high infant mortality, illiteracy, deforestation, desertification, environmental stress, and the other symptoms of underdevelopment have continued to stalk the LDCs. The socio-economic structures of most of the LDCs are now collapsing, and in many countries, growth and progress have come to a halt, thus increasing social frictions.

15. If unattended, the above-mentioned interrelated demographic and economic processes are likely to postpone socio-economic progress indefinitely. The challenges they present to national development efforts are daunting. Increased demands for food supplies and agricultural products, for example, will deflect domestic resources from other economic and social sectors, while basic social services such as education, health and housing will be unable to keep pace with population growth. For example, in countries such as Bangladesh, Burundi, Rwanda, Malawi and Nepal, where the population is still largely dependent on agriculture and the amount of new land or other resources is limited, progress in the face of rapid population growth will be extraordinarily difficult. Agricultural modernization and diversification into manufacturing will require large new investments in both human and physical capital, along with considerable administrative and political skill to ensure efficient allocation of scare investment resources. Even in countries with untapped natural resources, such as the Central African Republic, Chad and Mauritania, rapid population growth makes it more difficult to effect the investments in complementary inputs--roads, public services, drainage and other agricultural infrastructure--and in human skills need to tap such resources. Unless population policies and programmes are implemented effectively and socio-economic development is expanded rapidly in anticipation of population increases, the problems facing the LDCs in the decade ahead are likely to become insuperable.

5/ On 22 May 1990 Democratic Yemen and Yemen merged to form a single State. Since that date they have ben represented as one Member with the name "Yemen". The data in this report were compiled before that event.

III. POPULATION POLICIES AND PROGRAMMES

A. National responses to demographic conditions

16. Awareness of the implications of population growth increased dramatically after the adoption of the SNPA in 1981. In that year, according to the United Nations Inquiry, only 11 of the LDCs viewed their population growth rates as being too high. 6/ Of these countries, 7 intervened directly to influence the rates. By 1988, however, 22 countries--52 per cent of the LDCs--viewed their rates of population growth as being too high. 7/ These 22 countries represented two thirds of the total population of the LDCs. Of the 22, 16 reported interventions to lower their growth rates, including some of the more populous LDCs, such as Bangladesh and Nepal.

17. Increasing concern over rapid population growth led most of the LDCs to enact policies to deal with population trends. In the 1970s, Bangladesh, Botswana and the Gambia adopted national population policies. Between 1981 and 1988, two more countries, Cape Verde and Rwanda, formulated and adopted explicit population policies. Meanwhile, a number of other countries completed, or were in the process of completing, their draft national population policies and action plans in which population factors were integrated into long-term development plans. This was taking place in, for example, Benin, Burkina Faso, Ethiopia, Lesotho, the Niger, Sao Tome and Principe, Sierra Leone, the Sudan, Togo and the United Republic of Tanzania. At the same time, many of the LDCs adopted measures for dealing with specific population issues, such as fertility, mortality, migration and population distribution. These measures are briefly reviewed below.

1. Fertility

18. In 1988, 26 Governments of the LDCs, with three quarters of the total population of the LDCs, perceived their fertility levels as too high. This figure represented an increase of 15 countries over the 1981 enumeration. Burkina Faso, Burundi, Cape Verde, the Central African Republic, Ethiopia, the Gambia, Guinea, Guinea-Bissau, Kiribati, Malawi, the Niger, Samoa, Sierra Leone, the United Republic of Tanzania and Yemen, which had previously assessed their fertility levels as being too low or satisfactory, reported their concern that rates were too high.

6/ World Population Trends and Policies: 1981 Monitoring Report, Vol. II, Population Policies (United Nations publication, Sales No. E.82.XIII.3).

7/ Throughout section III, unless otherwise indicated, the 1988 figures concerning Governments' perceptions of demographic trends are from World Population Monitoring 1989 (United Nations publication, Sales No. E.89.XIII.12).

19. Moreover, 19 of the 26 countries that perceived fertility as too high were intervening to lower their fertility levels. Among the other 23 LDCs, 3 were intervening to maintain their fertility levels, 1 was intervening to raise it and the remainder were not intervening. Among the LDCs that were intervening to lower fertility, 5 countries--Bangladesh, Haiti, Kiribati, Nepal and Rwanda--had adopted quantitative fertility targets in support of their fertility-reduction goals.

20. To influence fertility levels, LDC Governments adopted such measures as making access to contraceptive methods legal, providing family planning services, improving the status of women, raising the minimum legal age for marriage, permitting access to abortion and offering tax schemes and child welfare allowances.

21. Of these measures, the organization, expansion and strengthening of family planning or child-spacing services have become generally accepted, and an increasing number of Governments are making family planning services more accessible. Whereas in 1981 several Governments (among them, Chad and Malawi) restricted access to such services, by 1987 only one country--the Lao People's Democratic Republic--reported having restricted access. A total of 9 countries had changed their policies in favour of support for family planning: Burkina Faso, the Central African Republic, Chad, Comoros, Guinea, Malawi, the Niger, Somalia and Sao Tome and Principe. Consequently, information about contraception has been spreading, principally through the efforts of structured national family planning programmes.

22. Although no estimate of contraceptive prevalence can be given for all the LDCs, there are indications of increased contraceptive practice in a few countries, including Bangladesh, Botswana and Nepal, where recent levels of contraceptive prevalence are in the range of 14-28 per cent (see table 2), as against 2-8 per cent in the mid-1970s. 8/

23. Among other measures to implement fertility policies, some Governments recently enacted legislation to change the legal age at marriage. Togo and Uganda raised their legal marital age to 17 and 18, respectively. Moreover, most of the LDCs adopted measures to improve the status of women--primarily legislation designed to ensure equal status and opportunity and the freedom to participate in policy- and decision-making. Such measures are expected to have a significant impact on fertility levels. In addition, a number of Governments, including Botswana, Lesotho, Maldives, the Niger and the Sudan, have established administrative bodies to co-ordinate women's activities.

24. All the measures to implement fertility policies have been complemented by strong efforts to change attitudes, including persuasion campaigns relying upon traditional and modern information media techniques.

8/ Levels and Trends of Contraceptive Use As Assessed in 1988 (United Nations publication, Sales No. E.89.XIII.4), table 4.

2. Mortality

25. In 1988, with the exception of the Governments of the Lao People's Democratic Republic, Rwanda and Yemen, which perceived their mortality levels as acceptable, 39 Governments of the LDCs continued to regard their current levels of mortality and morbidity as unacceptable. 9/ In terms of life expectancy, only a handful of countries are expected to reach the minimum target--60 years by the year 2000--set by the International Conference on Population held at Mexico City in 1984. 10/ According to current projections, the LDCs as a whole will fall short by 7 years in attaining that goal.

26. In recent years, most countries have analysed their health sectors and attempted to plan the best use of domestic resources and technology to maximize health benefits from these investments. Because of the scarcity of resources--both funds and trained personnel--a growing number of LDC Governments have adopted low-cost health interventions intended to produce a faster rate of mortality decline. Activities have included the expansion of health care facilities in rural areas; increase in community involvement in health activities; control of endemic diseases through improved environmental sanitation, immunization (see paragraph 29) and improved maternal and child health (MCH) care; provision of potable water; improvement in nutritional standards; and investments in training of health workers and health education.

27. As of 1988, 21 of the LDCs had adopted quantitative targets to reduce mortality, morbidity and infant mortality or to increase health services. The countries were Afghanistan, Bangladesh, Bhutan, Botswana, Burkina Faso, Djibouti, Ethiopia, Guinea-Bissau, Haiti, the Lao People's Democratic Republic, Lesotho, Maldives, Mali, Nepal, Rwanda, Sao Tome and Principe, Somalia, the Sudan, Togo, Uganda and the United Republic of Tanzania.

28. The targets varied. Botswana adopted targets of reducing infant mortality to below 50 per 1,000 while increasing life expectancy to above 60 years by the year 2000. Ethiopia aimed at cutting infant mortality by 50 per cent and at providing basic health services to cover 85 per cent of the population by 1990. It also aimed at reducing child mortality in Addis Ababa from 136 per 1,000 live births in 1985 to less than 50 per 1,000 by 1990. Haiti's targets for the year 2000 were to attain a life expectancy of 70 years, an infant mortality rate of 30 per 1,000 live births and maternal mortality of 0.7 per 1,000. Mali was committed to reducing mortality rates in half by 1990. Rwanda aimed at lowering its crude death rate from 17 to 14 per 1,000 and infant mortality from 140 to 100 per 1,000 live births.

29. In an effort to reduce infant and child mortality, vaccination programmes designed to provide immunization for all by 1990 were being accelerated in 12 countries--Bangladesh, Bhutan, Botswana, Burkina Faso, Ethopia, Haiti, Lesotho, Rwanda, Somalia, the Sudan, the United Republic of Tanzania and Yemen.

9/ World Population Monitoring 1989 and World Population Trends and Policies: 1987 Monitoring Report (United Nations publication, Sales No. E.88.XIII.3).

10/ Report of the International Conference on Population, para. 21.

3. Population distribution and migration

30. Over the decade, most of the LDCs were deeply concerned about complex population distribution issues. Those issues include the rapid growth of cities with all its implications, the depopulation of rural areas and the attendant regional imbalances. As of 1988, a total of 24 countries had adopted policies to influence internal migration trends. In most instances, these policies were designed to slow rural-urban or urban-urban migratory flows. Governments also adopted various strategies to influence population distribution and migration. Some designed comprehensive strategies to slow urban growth, promote the development of small towns and intermediate cities, and rationalize urban and rural plans.

31. To implement these strategies, Governments adopted a broad range of policy measures dealing with state, private-sector and individual activities. For example, as of 1988, almost all the LDCs used public infrastructure subsidies to influence population distribution. Fifteen (Botswana, Burundi, Cape Verde, Chad, Democratic Yemen, Ethiopia, Guinea-Bissau, Maldives, Mali, Mauritania, Mozambique, Nepal, the Niger, Sierra Leone and Somalia) employed state investment in directly productive activities. Twelve (Bangladesh, Botswana, Burundi, Ethiopia, Guinea-Bissau, Lesotho, Mauritania, Nepal, Sierra Leone, Somalia, the Sudan and Uganda) used grants, loans and tax incentives. Eleven (Bangladesh, Burkina Faso, Burundi, Comoros, Guinea-Bissau, Haiti, Mauritania, Nepal, Sierra Leone, Somalia and Uganda) adopted measures to encourage growth centres. As for policies directly affecting individuals, 37 of the LDCs invested in human resources and job training to influence population distribution. Moreover, 30 LDC Governments adopted housing and social services policies.

32. Many of the LDCs initiated rural development programmes in the form of agricultural development, land reform, provision of infrastructure and public services, community development, organization of markets and supervised credit. Several countries undertook land settlement schemes and their implicit infrastructural support, such as migration assistance and the provision of agricultural inputs. For example, Ethiopia formulated an ambitious population redistribution strategy aimed at resettling 1.5 million people from the country's drought-stricken northern areas to more fertile areas in the west and south. Chiefly by means of industrial location policies, it also aimed at promoting a network of secondary urban centres.

33. Chad, the Gambia and Somalia provided for the establishment of physical infrastructure and services as well as for the development of rural resources. Rwanda, after experimenting with rural resettlement programmes, intensified these efforts at the national level while simultaneously promoting regional growth centres to offset the attraction of its capital city. Malawi improved communications and promoted small-scale industrial development, thereby reducing rural-urban migration. In the Niger, the main thrust of the population distribution policy was the settling of nomads. In Benin, socio-economic activities were to be decentralized over the next decade to bring about more equitable distribution of population. Nepal established a task force to promote rural markets and rural growth centres.

B. UNFPA assistance

34. In response to the SNPA for the LDCs, the Governing Council of UNFPA-United Nations Development Programme (UNDP), at its twenty-ninth session (1982), resolved, inter

alia, that two thirds of UNFPA resources for country programmes should be allocated to 53 developing countries, designated as priority countries. Of these priority countries, 31 were LDCs (out of a total of 36 LDCs at the time). The Governing Council also decided that UNFPA should concentrate its resources to support the following, listed in priority order: (a) maternal and child health and family planning; (b) population information, education and communication (IEC); (c) basic data collection; (d) population dynamics; and (e) formulation, implementation and evaluation of population policy. The Governing Council further recommended that 5 of the LDCs not included among the designated priority countries should be given special attention.

35. Since then, UNFPA has translated these Governing Council policy decisions and recommendations into programme activities, directed primarily towards the following:

(a) Developing a programming approach to population designed to increase programme activities and to emphasize the importance of integrating population dimensions into other development sectors;

(b) Formulating and carrying out comprehensive programmes aimed at concentrating efforts and funds to develop human resources and service programmes to improve the population's well-being, thereby contributing to long-term improvements in the quality of life; and

(c) Through data collection and population IEC activities, stimulating among inhabitants of the LDCs awareness of the significance of population factors.

1. Programming approach

36. Between 1981 and 1989, at the request of the Governments concerned, UNFPA completed needs assessment exercises in most of the LDCs. Designed to reveal population and development requirements as the basis for formulating strategies to meet them, these assessments also provided recommendations within which national Governments and multilateral and bilateral donors could channel co-ordinated and effective population assistance. The needs assessment became the principal method for programming population assistance during the 1980s, and countries were able to move gradually from a project-based approach to a programme-based approach incorporating a cluster of complementary activities. As a result of these undertakings, over the period 1981-1989, the Governing Council approved large-scale programmes for 37 LDCs.

2. Major areas of population assistance

37. From 1981 to 1989, UNFPA assistance to the LDCs amounted cumulatively to $198.1 million, 11/ representing an increase of more than 100 per cent over the period 1973-1980 ($74.0 million). Of this $198.1 million, 20 per cent supported technical advisory services; 14 per cent, salaries of local personnel; 16 per cent, training; and 34 per cent, equipment and materials. The number of project activities supported by UNFPA totalled more than 700, benefiting the LDCs in Africa, Asia and the Pacific, the Middle East and the Mediterranean, and Latin America and the Caribbean. (See table 3 for assistance by work plan category and table 4 for assistance to individual countries.)

11/ All dollar figures are U.S. dollars.

38. Most project activities were executed in collaboration with United Nations agencies--including the Food and Agriculture Organization of the United Nations (FAO), the International Labour Organisation (ILO), the United Nations Children's Fund (UNICEF), UNDP, the United Nations Educational, Scientific and Cultural Organization (UNESCO) and the World Health Organization (WHO)--as well as Governments and non-governmental organizations (NGOs), such as the International Planned Parenthood Federation (IPPF).

(a) Maternal and child health and family planning

39. UNFPA assistance for MCH/FP in 1981-1989 totalled $92.5 million, or 47 per cent of total programme expenditures for the LDCs. In comparison, from 1973 to 1980, assistance for this area totalled $30.6 million, or 41 per cent of total programme expenditures.

40. Family planning activities and child-spacing services in the context of MCH services were the major focus of UNFPA programmes in the LDCs. Efforts were directed towards creating a national infrastructure through the provision of training in planning, supervision and management as well as other initiatives necessary for the performance of essential functions.

41. Because concern for providing family planning services to hard-to-reach groups had grown in many of the LDCs, a sizeable proportion (26 per cent) of UNFPA resources for MCH in the LDCs was channelled into services to meet the needs of underprivileged rural populations and marginal groups in urban areas. In this respect, ongoing activities were strengthened in 31 countries and new project activities undertaken in 10 countries. By the end of 1988, all the LDCs were participating directly in activities related to family planning or child-spacing. Research in family planning and in social, operational and biomedical areas was being conducted at one national institution, in Benin.

(b) Population information, education and communication

42. In the 1981-1989 period, Governments became increasingly interested in initiating population education and communication activities, and the number of countries undertaking IEC activities continued to grow. UNFPA assistance for IEC totalled $22.6 million, or 11 per cent of total programme expenditures in the LDCs, compared with $5.2 million, or 7 per cent of expenditures, from 1973 to 1980.

43. Activities were initiated in formal and non-formal curricula, both in the organized and the non-organized sectors. Assistance focused on two major activities: (a) population education, including population studies, family life education, sex education and health education activities aimed at increasing awareness and understanding of the implications of population issues and human reproduction among adults and adolescents; and (b) communication activities designed to identify suitable means, methods and training for the delivery of population information directed at various target groups.

44. UNFPA provided assistance to 13 LDCs to introduce population education into their formal school systems. These programmes focused generally on strengthening understanding of the implications of population change and also on the teaching of human reproduction, family planning and sex education within the context of family life education. In addition, UNFPA provided 29 countries wit[h] assistance for population education associated with comprehensive

educational programmes, with objectives such as adult literacy, agricultural extension, labour and trade union education, home economics and rural development. UNFPA provided 6 countries with IEC assistance to support family planning, census-taking and civil registration activities.

(c) Basic data collection

45. From 1981 to 1989, UNFPA assistance for basic data collection totalled $44.0 million, or 22 per cent of total programme expenditures on the LDCs. In comparison, during the 1973-1980 period, expenditures for this purpose totalled $33.6 million. Support was designed to develop national capacity within the LDCs for collecting, analysing and using population data. To promote self-reliance, high priority was accorded to the following:

(a) Human resources development through training programmes, the transfer of technical skills and institution-building;

(b) The supply of equipment necessary for strengthening national statistical offices; and

(c) Operational research and innovative pilot projects.

46. Because of the basic role of population data in the identification of population problems related to growth, spatial distribution, fertility and mortality, as well as in the development of programmes to cope with these problems, assistance was provided for census activities in 27 countries. Among these countries, the Comoros, Djibouti, Equatorial Guinea, Ethiopia and Guinea conducted their first censuses. Other assistance for data collection included demographic surveys designed to assess population dynamics in 10 LDCs through improved analysis of fertility and mortality levels and migration trends. Other assistance was provided to improve the quality and coverage of civil registration and vital statistics systems in 8 countries.

(d) Population research, training and policy development

47. In 1981-1989, UNFPA assistance for population research, training and policy development totalled $30.0 million, or 15 per cent of total programme expenditures for the LDCs. In 1973-1980, the figure was $630,000.

48. Because many of the LDCs lack the personnel and facilities for undertaking demographic analysis and research, UNFPA directed a significant portion of its resources (19 per cent) to strengthening national training and research institutions in 17 countries. In a number of countries, UNFPA also supported the analysis of demographic data and their interrelationships with socio-economic data; research on the determinants and consequences of fertility, mortality and migration; and changes in the role of women and family formation.

49. In 12 LDCs, assistance was provided to promote the integration of population matters into the development planning process through the establishment of population units in national development planning institutions.

(e) Special programmes for women

50. Given the growing importance of the role of women in population and development and the recommendations of the SNPA to provide equal opportunities for women, UNFPA expanded

its support for women, population and development activities over the 1981-1988 period. Assistance for this area totalled $9 million, or 5 per cent of total expenditures for the LDCs, compared with $400,000 in 1973-1980.

51. In 13 LDCs, new initiatives were developed to encourage the participation of women in population programmes. Most activities were designed to create and increase awareness and understanding of population-related matters. UNFPA also supported training to improve the self-development of women in the LDCs.

3. Follow-up activities

52. During the period under review, UNFPA participated in a number of working sessions convened by UNDP and consultative group meetings organized by the World Bank. The purpose of these meetings was to stimulate external resources for the LDCs and help them plan their future.

53. UNFPA also conducted several evaluation and monitoring exercises in the LDCs to improve the quality and effectiveness of its assistance. Independent, in-depth evaluations of UNFPA-assisted country programmes or projects were undertaken in Afghanistan, Bangladesh, Botswana, Democratic Yemen, Malawi, Nepal, Rwanda and Sierra Leone. In addition, projects in all the LDCs were monitored regularly through tripartite reviews and annual country reviews, which included examinations of input deliveries, work schedules, outputs and related activities.

IV. AREAS FOR FURTHER ACTION

54. Much was done in the 1981-1989 period to activate population programmes contained in the Substantial New Programme of Action for the Least Developed Countries. Although it is too early to assess the impact of these activities on population trends, it is clear that Governments of the LDCs have recognized population-related problems and attempted to increase public understanding of the complex issues and the means to deal with them.

55. Over the decade, most of the LDCs progressed in developing and implementing comprehensive national programmes. Underscoring their growing recognition of the importance of population issues, more than 30 LDCs undertook one or more of the following types of action: made explicit statements on population policy--5 LDCs had already adopted a national population policy and by 1990, 6 more were expected to have done so; emphasized the relationship of population to national development; adopted constitutional amendments; established high-level units to formulate policies or co-ordinate programmes; increased the resources available for family planning and child-spacing programmes; eliminated restrictions on family planning information, services and supplies; provided special benefits for family planning acceptors or couples with small families; and enacted measures to improve the status of women, thereby indirectly affecting child-bearing patterns. Multilateral, bilateral and private participation in all these activities grew steadily over the past decade.

56. As a result, encouraging signs are beginning to appear. Fertility levels in Bangladesh and Botswana have declined over the decade from 6 and 7 births per woman to 4.5 and 5.0, respectively. 12/ These trends are yielding clues to changes in governmental attitudes and actions in the LDCs.

57. Despite this progress, important issues have remained unsolved. The expansion of population programmes at the national level has proved difficult. Among the reasons for this are political, administrative and logistical obstacles as well as the scarcity of qualified personnel and limited demand--all of which have slowed the rate at which programmes can be expanded. Effective implementation of population policies and programmes continues to be deferred, partly because of the lack of human and financial resources and partly because of the lack of awareness that such policies and programmes can bring about substantial long-term develoment benefits. Discussions in international forums about solutions to the problems of the LDCs--in particular, the problem of foreign debt--receive more attention from LDC Governments than do long-term problems such as population. Hence, most countries have made only modest progress in bringing population growth and economic development into balance. The LDCs as a whole need a major effort to promote and implement effective national population policies and programmes to reverse unfavourable demographic trends. Six areas for further action are identified below.

12/ The recent figure for Bangladesh is from the National Institute of Population Research and Training (NIPORT), Preliminary Report on the Bangladesh Fertility Survey, 1989 (Azimpur, Dhaka, Bangladesh); the recent figure for Botswana is from the Demographic and Health Survey, 1988.

A. Government commitment

58. Although the adverse effects of rapid population growth are increasingly recognized, Governments of the LDCs must move from expressing concern in policy documents to committing public resources to national population programmes. Public support for population programmes is expressed theoretically through Government statements, but practically through the provision of technical, financial and managerial support for the promotion and delivery of a national programme. In all but a few countries, commitment to population policy has not yet been demonstrated by firm political and financial support. As a result, little concrete progress has been made in most of the LDCs towards increasing the demand for family planning.

59. In an environment where fertility remains high, Governments should take the lead in encouraging the provision of services and a wide use of innovative outreach and community programmes. Governments should also take the initiative by disseminating information on population and particularly on family planning. This goal can be accomplished through mass media campaigns, educational talks by health workers at health facilities, IEC campaigns in schools and work-places, promotional activities by extension or outreach workers, and special seminars and study tours for high-level officials and leaders. Moreover, the Government need not be the sole provider of the above services. NGOs and other institutions should be encouraged to offer effective and innovative family planning and IEC programmes at the community level.

B. Population data

60. Censuses have helped improve demographic knowledge in the LDCs. However, many of the LDCs need to strengthen their data collection machinery. At present, none of the LDCs has an effective vital registration system, and the complexities and costs of improving those systems are great. Hence, it would be unrealistic to assume that better information will soon become available. National sample surveys can help fill the data gaps arising from deficient vital registration procedures. They can also provide information for more specific purposes. For example, fertility and family planning surveys and contraceptive prevalence studies would improve knowledge of fertility levels and contraceptive acceptance. At present, only a few of the LDCs have assembled current fertility trend data to match the figures for 1981-1988. A total of 19 LDCs have yet to provide national fertility rates for any period in the 1980s, and 9 of these countries provided no fertility estimates for the previous decade. It follows that efforts should be made to institutionalize a permanent survey capability in these LDCs to generate the information required to implement and monitor population policies and programmes.

C. Family planning and child-spacing programmes

61. Family planning and child-spacing services exist in almost all the LDCs, although many are at an early stage of development and are not yet able to influence high fertility levels. Such programmes have encountered numerous difficulties, financial and technical. Because of insufficient funds, shortage of trained personnel and vehicles, and logistical problems, coverage has been inadequate and services have often been superficial.

62. To improve service delivery, efforts should be made to consolidate, strengthen and expand programmes through the following:

(a) Extensive training of all categories of health personnel;

(b) Provision of sufficient equipment and supplies;

(c) Intensive socio-cultural research into attitudes towards family size;

(d) Development of service statistics and commodity management systems for MCH/family planning/child-spacing to monitor progress and the quality of services; and

(e) Improved management of FP and child-spacing services.

63. Although biomedical research into contraceptive technology has not resulted in any breakthroughs in recent years, there have been substantial improvements in the design of intra-uterine devices (IUDs) and quality control of condoms. In addition, there is more general use of low hormonal dosage oral pills, and of Norplant. Many of these developments have made contraceptive practice safer and more effective.

64. Because no technological breakthroughs are foreseen, the LDCs should make optimal use of existing methods and should broaden the range of options through the "cafeteria approach", choosing an acceptable and effective mix of methods compatible with the cultural setting. They should also enhance contraceptive effectiveness through better counselling and follow-up.

D. Improvement in the status of women

65. In many of the LDCs, women represent more than 50 per cent of the population and as much as 60 per cent of the labour force in certain sectors. In addition, they grow about 80 per cent of the food. Yet women earn only about 10 per cent of the money income and own about 1 per cent of the assets. In addition to child rearing, they provide health care for the family, run the household, cook and manage family resources. However, their economic and social contribution is rarely recognized in national development strategies. They seldom participate, other than in a peripheral way, in shaping their countries' economic and social policies.

66. As policies for sustainable development take shape, women's contribution should be fully recognized. Governments should integrate women into the development process and provide them with broadened social and economic opportunities. Such improvements in the condition of women would have major social benefits and would undoubtedly translate into considerable economic benefits to each country as a whole. To this end, Governments should (a) provide women with opportunities for improving their economic position through increasing their assets and the productivity of their assets, e.g., through access to credit and agricultural extension services, and (b) improve women's access to basic social services, e.g., educational, health, nutrition support and population-related programmes. Because of their traditional role as caretaker of the family, the process of improving the condition of women in the LDCs may generate new signals that reduce fertility. Women's fertility behaviour changes as they become educated. They are better able to care for their children and other family members, so that

more children survive disease. In addition, with education and greater income-earning opportunities, women become less dependent on their children as workers and sources of old-age security. Finally, women's fertility decisions change in response to the spread of information about, and access to, appropriate family planning/child-spacing methods.

E. Human resources development

67. Meeting the SNPA population objectives will depend basically on the effective use and expansion of all human resources needed to formulate, implement, manage and monitor population policies and programmes. At present, most of the LDCs lack the capability for managing such policies and programmes effectively. Therefore, sustained efforts should be made at all levels and in all programme sectors to strengthen the capability of governmental and non-governmental bodies to improve the design, management and evaluation of national population policies and programmes.

68. Over the next 10 years, steps should be taken to ensure that national population policies and programmes include comprehensive training programmes for the development and deployment of human resources. In this way, each LDC can build up a pool of trained staff able to design, administer and evaluate population programmes to meet national aspirations. To accomplish this, existing training facilities at country, subregional and global levels should be used to the fullest extent.

F. Financial support

69. One of the most critical issues confronting LDC Governments in implementing their population policies and programmes is financial. Although these countries have primary responsibility for implementing their national population policies and programmes, they cannot be expected to succeed without outside assistance. The world economic malaise has constrained their internal and external resources, leading, in many of the LDCs, to shortages in supplies of drugs, equipment, contraceptives and transport. These circumstances have crippled family planning and child-spacing programmes and related population activities and exacerbated the difficulties of creating an environment favourable to fertility decline. Considerable efforts at national and international levels will be required to promote population activities within the LDCs.

70. A growing number of the LDCs are now at a turning point in their willingness to implement major population programmes and policies. However, unless enough external and internal support is forthcoming, they may go no further. Even if costs can be contained, spending on population service programmes will have to increase simply to keep up with population growth. At a minimum, spending on population programmes should be an increasing proportion of both government budgets and aid programmes. The LDC Governments must plan to bear some operational and maintenance costs of their population activities from domestic resources.

71. The funding of population policies and programmes must be sustained and insulated from short-term budgetary pressures, if such activities are to be effective. However, given the precarious conditions in the LDCs and budget cuts accompanying the structural adjustment exercises in which many LDCs are engaged, the success of population programmes and policies in these countries will depend a great deal on generous external assistance. Donors should

increase their assistance to provide both immediate support and the continuing assistance needed by the LDCs to implement their population policies and programmes. Moreover, the aid must be flexible enough to address identified needs.

G. Conclusion

72. Though the problems facing the LDCs are still daunting, there is reason for hope, given the widening recognition that attention to population growth is itself one of the keys to a better future. The time is now ripe for redoubled efforts in these countries. Unlike the situation a decade ago, more than half the Governments of the LDCs now recognize that populations are growing at rates that are too high, outstripping all efforts to create and sustain socio-economic development. The two-way relationship between population growth and development efforts has also become clear. As awareness has grown, so too has the commitment to bringing population growth and development into balance. Progress in such countries as Bangladesh and Botswana demonstrates that, with efficient national population programmes and policies and appropriate assistance from the international community, the LDCs can begin to turn their population and development situations around. Hence if the LDCs as whole translate their political will into action and donors increase assistance for population activities as well as for broader development programmes, the stage will be set for balanced development in the decades ahead.

LIST OF ABBREVIATIONS

CBR	Crude birth rate
CDR	Crude death rate
FAO	Food and Agriculture Organization of the United Nations
FP	Family planning
GDP	Gross domestic product
ILO	International Labour Organisation
IMR	Infant mortality rate
IPPF	International Planned Parenthood Federation
LDC	Least developed country
MCH	Maternal and child health
NGO	Non-governmental organization
SNPA	Substantial New Programme of Action
TFR	Total fertility rate
UNCTAD	United Nations Conference on Trade and Development
UNDP	United Nations Development Programme
UNESCO	United Nations Educational, Scientific and Cultural Organization
UNFPA	United Nations Population Fund
UNICEF	United Nations Children's Fund
WHO	World Health Organization

Table 1. Selected demographic and economic indicators for the Least Developed Countries

Country	Population					PNB per capita 1987
	Size (000) 1989	Growth rate 1985-1990	Projected "Doubling time"	Urban size (000) 2000	Urban (%) 1985-1990	
Afghanistan	16,127	2.63	27	26,608	19	* 220
Bangladesh	112,547	2.67	26	150,589	12	160
Benin	4,594	3.15	22	6,561	35	300
Bhutan	1,484	2.15	33	1,906	5	150
Botswana	1,241	3.51	20	1,804	19	1,030
Burkina Faso	8,770	2.67	26	2,025	8	170
Burundi	5,297	2.88	24	7,283	6	240
Cape Verde	369	2.81	25	518	53	500
Central African Republic	2,842	2.46	28	3,765	42	330
Chad	5,540	2.47	28	7,337	27	150
Comoros	503	3.11	22	710	25	380
Democratic Yemen	2,416	3.07	23	3,430	40	420
Djibouti	395	2.96	24	552	78	*770
Equatorial Guinea	430	2.34	30	561	60	*120
Ethiopia	45,812	2.01	35	61,206	12	120
Gambia	834	2.83	25	1,116	20	220
Guinea	6,708	2.48	28	8,879	22	*290
Guinea-Bissau	967	2.08	34	1,244	27	170
Haiti	6,383	1.88	37	7,837	27	360
Kiribati	67	1.22	57	77	34	480
Lao People's Democratic Republic	3,970	2.49	28	5,134	16	160
Lesotho	1,724	2.85	25	2,354	17	360
Malawi	8,153	3.31	21	11,706	12	160
Maldives	208	3.20	22	283	26	300
Mali	9,091	2.94	24	12,658	18	200
Mauritania	1,970	2.73	26	2,685	35	440
Mozambique	15,254	2.65	26	20,445	19	150
Myanmar	40,814	2.09	34	51,129	24	*180
Nepal	18,675	2.47	28	24,084	8	160
Niger	6,898	3.01	23	9,750	16	280
Rwanda	6,990	3.40	21	10,144	6	310
Samoa	168	0.85	82	181	21	*290
Sao Tome and Principe	109	2.78	25	149	35	280
Sierra Leone	4,049	2.49	28	5,399	28	300
Somalia	7,308	3.32	21	9,803	33	290

Table 1 continued

Country	Size (000) 1989	Population: Growth rate 1985-1990	Population: Projected "Doubling time"	Population: Urban size (000) 2000	Population: Urban (%) 1985-1990	PNB per capita 1987
Sudan	24,480	2.88	24	33,610	21	330
Togo	3,349	3.09	23	4,727	22	300
Tuvalu	9	1.27	55	10	..	*600
Uganda	17,810	3.49	20	26,285	9	260
United Republic of Tanzania	26,344	3.67	19	39,572	24	220
Vanuatu	159	2.88	24	219	18	*700
Yemen	7,777	3.04	23	11,145	20	580

Sources: Population figures are from World Population Prospects: 1988 (United Nations publication, Sales No. E.88.XIII.7), medium variant. Per capita gross national product (GNP) figures are from the United Nations Development Programme, "Statistics on 185 Countries and Territories", unpublished.

Notes: Doubling time is the estimated time it would take for the population to double in size.

An asterisk (*) indicates 1983 gross national product per capita.

Two dots (. .) indicate that data are not available or not separately reported.

On 22 May 1990, Democratic Yemen and Yemen merged to form a single State. Since that date they have been represented as one Member with the name "Yemen".

Table 2. Selected demographic and social indicators for the Least Developed Countries

Country	Total fertility rate	Crude Birth rate	Crude Death rate 1985-1990	Life expectancy	Total infant mortality rate	Total Maternal mortality rate 1980-1987	Total Contraceptive prevalence rate (%) 1971-1987	Total Female literacy rate (%) 1985
Afghanistan	6.90	49	23	42	172	640	2	8
Bangladesh	5.54	42	16	51	119	600	25	22
Benin	7.00	51	19	47	110	1680	9	16
Bhutan	5.54	38	17	48	128	..	..	..
Botswana	6.25	47	12	59	67	300	28	70
Burkina Faso	6.50	47	19	47	138	600	1	6
Burundi	6.31	46	17	49	112	..	9	26
Cape Verde	5.18	38	10	61	66	134	..	39
Central African Republic	5.89	44	20	46	132	600	..	29
Chad	5.89	44	20	46	132	700	1	11
Comoros	6.19	46	15	52	80	..	..	40
Democratic Yemen	6.66	47	16	51	120	100	..	25
Djibouti	6.60	47	18	47	122	..	..	9
Equatorial Guinea	5.66	42	19	47	127	..	..	..
Ethiopia	6.15	44	24	4	154	2000	2	1
Gambia	6.39	47	21	43	143	..	..	15
Guinea	6.19	47	22	42	147	..	1	17
Guinea-Bissau	5.38	41	20	45	132	400	1	17
Haiti	4.74	34	13	55	117	340	7	35
Kiribati	4.53	32	6	70	30	..	..	..
Lao People's Democratic Republic	5.74	41	16	49	110	2	..	76
Lesotho	5.79	41	12	56	100	1600	5	85
Malawi	7.00	53	20	47	150	250	7	31
Maldives	4.72	35	12	57	102	..	..	82
Mali	6.70	50	21	44	169	..	5	11
Mauritania	6.50	46	19	46	127	68	1	..
Mozambique	6.39	45	19	47	141	300	..	22
Myanmar	4.02	31	10	60	70	140	5	56
Nepal	5.95	40	15	51	128	850	14	12
Niger	7.11	51	21	45	135	420	1	9
Rwanda	8.29	51	17	49	122	210	10	33
Samoa	5.08	34	5	71	26	40	18	98
Sao Tome and Principe	6.03	45	16	50	107	..	..	42
Sierra Leone	6.50	48	23	41	154	450	4	21
Somalia	6.60	51	20	45	132	1100	..	7

Table 2 continued

Country	Total fertility rate	Crude Birth rate	Crude Death rate 1985-1990	Life expectancy	Total infant mortality rate	Total Maternal mortality rate 1980-1987	Total Contraceptive prevalence rate (%) 1971-1987	Total Female literacy rate (%) 1985
Sudan	6.44	45	16	50	108	655	5	14
Togo	6.09	45	14	53	94	84	..	29
Tuvalu	5.08	34	5	71	26	..	..	..
Uganda	6.90	50	15	51	103	300	1	45
United Rep. of Tanzania	7.11	51	14	53	106	370	1	88
Vanuatu	5.26	37	10	58	52	..	13	68
Yemen	6.97	48	16	51	116	..	1	3

Sources: Total fertility rates, crude birth and death rates, and life expectancy figures are from World Population Prospects: 1988 (United Nations publication, Sales No. E.88.XIII.7), medium variant. Infant mortality rates are from same source and also United Nations Children's Fund, State of the World's Children 1989 (New York, 1989). Maternal mortality rates are from the World Health Organization, Maternal Mortality Rates: A Tabulation of Available Information, 2nd ed. (Geneva, 1985); United Nations Children's Fund, The State of the World's Children 1989; and John A. Ross and others, Family Planning and Child Survival: 100 Developing Countries (New York, Columbia University, Center for Population and Family Health, 1988). Contraceptive prevalence rates are from Levels and Trends of Contraceptive Use as Assessed in 1988 (United Nations publication, Sales No. E.89.XIII.4). Female literacy rates are from United Nations Educational, Scientific and Cultural Organization, Compendium of Statistics on Illiteracy, No. 30 (Paris, 1988).

Notes: Two dots (. .) indicate that data are not available or not separately reported.

Data for maternal mortality and contraceptive prevalence are the most recent available within the period indicated; the female literacy rate is for 1985 or the year closest to 1985.

On 22 May 1990, Democratic Yemen and Yemen merged to form a single State. Since that date they have been represented as one Member with the name "Yemen".

Table 3. UNFPA assistance to the Least Developed Countries by work plan categories, 1981-1989 (in US dollars)

Work Plan Categories	Amount	Percentage
Basic data collection	43,979,344	22.2
Population dynamics	20,492,160	10.3
Formulation/evaluation of population policy	9,422,182	4.8
Family planning	92,548,895	46.7
Information, education and communication	22,651,179	11.4
Special programmes	3,525,027	1.8
Multi-sector activities	5,493,111	2.8
Total 1981-1989	**198,111,898**	**100.0**

Source: United Nations Population Fund.

Table 4. UNFPA assistance to the Least Developed Countries, 1981-1989

Country	Amount (in $US)
Afghanistan	3,246,496
Bangladesh	27,761,543
Benin	5,203,526
Bhutan	2,172,192
Botswana	2,971,954
Burkina Faso	6,147,252
Burundi	5,614,714
Cape Verde	1,706,346
Central African Republic	3,272,850
Chad	1,029,769
Comoros	2,131,608
Democratic Yemen	8,097,290
Djibouti	1,186,774
Equatorial Guinea	2,737,800
Ethiopia	9,735,770
Gambia	1,832,699
Guinea	3,875,013
Guinea-Bissau	1,176,318
Haiti	6,516,460
Kiribati	552,893
Lao People's Democratic Republic	1,805,463
Lesotho	1,635,274
Malawi	4,888,719
Maldives	935,881
Mali	4,333,172
Mauritania	6,209,724
Mozambique	3,059,221
Myanmar (formerly Burma)	827,347
Nepal	14,442,012
Niger	4,861,628
Rwanda	5,395,572
Samoa	892,004
Sao Tome and Principe	1,198,871
Sierra Leone	4,328,526
Somalia	7,409,615
Sudan	13,050,191
Togo	2,952,214
Tuvalu	198,864
Uganda	5,627,735
United Republic of Tanzania	8,433,764
Vanuatu	1,328,889
Yemen	7,327 945
Total 1981-1989	**198,111,898**

Source: United Nations Population Fund.